

## CLAIMS

What is claimed is:

- ## 1. A process for generating computer flight plans on the

Internet comprising the elements of:

- a) a raw XY&Z database of chart data;
  - b) a data base containing aircraft data;
  - c) a software system to create VFR, IFR and Road charts;
  - d) an Internet web site accessible by a Client computer;
  - e) a software system which computes flight plans requested by means of the Internet web site Client computer;
  - f) a software system which allows for navigation data and aircraft editing by means of the Internet web site Client computer; and a software system which allows for outputting flight plans by means of the Internet web site Client computer.

- ## 2. A process for generating computer flight plans on the

Internet as claimed in claim 1 further comprising the steps of compiling a data base containing topographical data in the form of X, Y, and Z axis coordinates and process for of creating Background images (charts) which are color coded according to elevation using a software system and further generating relief chart shading by use of a software system in which said charts are shaded according to elevation and illumination angle.

- ### 3. A process for generating computer flight plans on the

Internet as claimed in claim 1 further comprising the step of compiling a data base containing navigational data, obstruction data

1 and other chart feature data in the form of X, Y, and Z axis  
3 coordinates and of merging topographical, navigational and Road data  
5 into one image (chart) by means of a software system.  
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9       4. A process for generating computer flight plans on the  
11 Internet as claimed in claim 1 further comprising the step(s) of  
13 placing text and other textual chart description in such a way as not  
15 to overwrite one text element with another.

17       5. A process for generating computer flight plans on the  
19 Internet as claimed in claim 1 wherein said element comprise a data  
21 base of rasterized charts consisting of pre-defined scales and chart  
23 features and a data base of routes consisting of pre-defined waypoint.  
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27       6. A process for generating computer flight plans on the  
29 Internet as claimed in claim 1 wherein said elements include a local  
31 area network consisting of a service and number of local Client  
33 computers or an Intranet network which is connected by means other  
35 than wires such as infrared or radio signals  
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39       7. A process for generating computer flight plans on the  
41 Internet as claimed in claim 6 further comprising the step(s) of  
43 computing by means of a software systems a cross section of the flight  
45 plan and displaying same in a profile window in which the route is  
47 displayed relative to terrain elevation, obstruction elevation,  
49 airspace, weather and flight altitude.

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8. A process for generating computer flight plans on the  
3 Internet comprising the steps of utilizing an Internet Server web site  
5 software by means of:

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9. A process for generating computer flight plans on the  
11 Internet as claimed in claim 8 further comprising the step of  
13 selecting the desired chart by means of an Internet web site software  
15 system which compiles the desired charts tiles requested by the Client  
17 computer.

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10. A process for generating computer flight plans on the  
23 Internet as claimed in claim 8 further comprising the step(s) of  
25 facilitating chart scrolling and chart viewing without refreshing the  
27 entire Client computer display by means of a software system served by  
29 an Internet web site.

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11. A process for generating computer flight plans on the  
33 Internet as claimed in claim 8 further comprising the step(s) of  
35 prompting and managing the required flight planning parameter by means  
37 of an Internet web site software which resides on the Server such  
39 flight planning variables inputted and requested by the remote  
41 computer.

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12. A process for generating computer flight plans on the  
47 Internet as claimed in claim 8 further comprising the steps(s) of  
49 computing by means of a software system the computed flight plans  
requested using the Internet web site remote computer.

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3       13. A process for generating computer flight plans on the  
5 Internet as claimed in claim 8 further comprising the step(s) of  
7 overlaying routes and waypoints by means of a software system on the  
desired chart.  
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11       14. A process for generating computer flight plans on the  
13 Internet as claimed in claim 8 further comprising the steps of filing  
15 flight plans by means of a software system through the use of the  
17 Internet web site remote computer and the steps of printing reports by  
19 means of a software system through the use of the Internet web site  
21 Client computer.  
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25       15. A process for generating computer flight plans on the  
27 Internet as claimed in claim 8 wherein said steps of facilitating  
29 navigation data entry and editing by means of a software system of the  
31 Internet web site remote computer and further facilitating the entry  
33 and editing by means of a software system, aircraft performance data  
35 editing through the use of the Internet web site Client computer.  
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39       16. A process for generating computer flight plans on the  
41 Internet as claimed in claim 8 wherein said step provides for overlay  
43 of graphical weather and textural data over the VFR, IFR, or Road  
45 chart along with the route line and waypoints on the Internet web site  
Client computer.  
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49       17. A process for generating computer flight plans on the  
Internet as claimed in claim 8 wherein said step includes the process

1 by which route waypoints are selected based on topographical,  
3 navigational, weather, geopolitical, airspace, and aircraft  
5 performance constraints.

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